

Date: Mon, 4 Apr 94 04:30:06 PDT  
From: Info-Hams Mailing List and Newsgroup <info-hams@ucsd.edu>  
Errors-To: Info-Hams-Errors@UCSD.Edu  
Reply-To: Info-Hams@UCSD.Edu  
Precedence: Bulk  
Subject: Info-Hams Digest V94 #373  
To: Info-Hams

Info-Hams Digest                      Mon, 4 Apr 94                      Volume 94 : Issue 373

Today's Topics:

    !! 22nd Annual Madison WI Swapfest !! Apr 10  
        Carrier operated relay  
Daily Summary of Solar Geophysical Activity for 02 April  
Daily Summary of Solar Geophysical Activity for 03 April  
    Looking for Kenwood TM-742a mods.  
        Packet Radio  
        Plain old repeaters  
        TM742 info/mods  
University of Florida, Gainesville  
    Wanted: Programable Keyer  
    Weather obs by packet

Send Replies or notes for publication to: <Info-Hams@UCSD.Edu>  
Send subscription requests to: <Info-Hams-REQUEST@UCSD.Edu>  
Problems you can't solve otherwise to brian@ucsd.edu.

Archives of past issues of the Info-Hams Digest are available  
(by FTP only) from UCSD.Edu in directory "mailarchives/info-hams".

We trust that readers are intelligent enough to realize that all text  
herein consists of personal comments and does not represent the official  
policies or positions of any party. Your mileage may vary. So there.

-----

Date: 4 Apr 94 00:06:52 GMT  
From: agate!howland.reston.ans.net!gatech!usenet.ufl.edu!usenet.cis.ufl.edu!caen!  
saimiri.primite.wisc.edu!news.doit.wisc.edu!news@ucbvax.berkeley.edu  
Subject: !! 22nd Annual Madison WI Swapfest !! Apr 10  
To: info-hams@ucsd.edu

Dateline: Madison Wisconsin

The Madison Area Hamfest is an excellent swapfest drawing hams from several  
states. It's held each spring at the Dane County Expo Center in its Forum  
Building.

It's \$5 at the door with doors opening at 8:00 am.

For more information you can contact Jim Waldorf KB9AQQ @ 608.249.7579 It is sponsored by the Madison Area Repeater Assoc.

Even if you're going to Dayton this is one of the best in the Midwest!

Kevin N9JKP

-----  
Date: 3 Apr 1994 23:22:55 GMT  
From: ihnp4.ucsd.edu!swrinde!cs.utexas.edu!utnut!torn!news.unb.ca!  
coranto.ucs.mun.ca!wstaub@network.ucsd.edu  
Subject: Carrier operated relay  
To: info-hams@ucsd.edu

Looking for source of carrier operated relay to build VHF FM  
linear.Replies by e-mail would be appreciated. 73's Werner, VO1CAT

-----  
Date: Sat, 2 Apr 1994 21:58:40 MST  
From: ihnp4.ucsd.edu!usc!math.ohio-state.edu!magnus.acs.ohio-state.edu!  
usenet.ins.cwru.edu!eff!news.kei.com!sol.ctr.columbia.edu!newsxfer.itd.umich.edu!  
nntp.cs.ubc.ca!alberta!ve6mgs!usenet@@  
Subject: Daily Summary of Solar Geophysical Activity for 02 April  
To: info-hams@ucsd.edu

/\

# DAILY SUMMARY OF SOLAR GEOPHYSICAL ACTIVITY

02 APRIL, 1994

/\

(Based In-Part On SESC Observational Data)

## SOLAR AND GEOPHYSICAL ACTIVITY INDICES FOR 02 APRIL, 1994

-----  
!!BEGIN!! (1.0) S.T.D. Solar Geophysical Data Broadcast for DAY 092, 04/02/94  
10.7 FLUX=079.3 90-AVG=100 SSN=000 BKI=3253 4435 BAI=025  
BGND-XRAY=A4.6 FLU1=2.4E+06 FLU10=1.2E+04 PKI=3245 4555 PAI=034  
BOU-DEV=033,013,070,039,044,068,036,095 DEV-AVG=049 NT SWF=00:000

XRAY-MAX= B2.3 @ 1217UT XRAY-MIN= A2.9 @ 2359UT XRAY-AVG= A7.1  
 NEUTN-MAX= +002% @ 1300UT NEUTN-MIN= -002% @ 1830UT NEUTN-AVG= -0.1%  
 PCA-MAX= +0.1DB @ 2335UT PCA-MIN= -0.1DB @ 2310UT PCA-AVG= +0.0DB  
 BOUTF-MAX=55366NT @ 2359UT BOUTF-MIN=55277NT @ 1853UT BOUTF-AVG=55323NT  
 GOES7-MAX=P:+000NT@ 0000UT GOES7-MIN=N:+000NT@ 0000UT G7-AVG=+062,+000,+000  
 GOES6-MAX=P:+129NT@ 1949UT GOES6-MIN=N:-116NT@ 0606UT G6-AVG=+080,+027,-049  
 FLUXFCST=STD:080,075,075;SESC:080,075,075 BAI/PAI-FCST=035,035,035/050,050,050  
 KFCST=3567 5443 3567 5443 27DAY-AP=009,045 27DAY-KP=2233 1223 5356 5555  
 WARNINGS=\*GSTRM;\*AURMIDWRN  
 ALERTS=  
 !!END-DATA!!

NOTE: The Effective Sunspot Number for 01 APR 94 was 41.6.  
 The Full Kp Indices for 01 APR 94 are: 1o 2- 2o 2- 2+ 2o 2+ 2-  
 The 3-Hr Ap Indices for 01 APR 94 are: 4 6 7 7 9 8 9 6  
 Greater than 2 MeV Electron Fluence for 02 APR is: 5.9E+06

#### SYNOPSIS OF ACTIVITY

-----

Solar activity was very low. Only weak B-class x-ray and sweep activity was reported this period, all before 02/1300Z. For the first time since 22 Sep 93, the disk is spotless. Of the two spotted regions reported yesterday, Rgn 7696 rotated off the disk and Rgn 7698 (S14W36) lost its spots.

Solar activity forecast: solar activity is expected to be very low.

The geomagnetic field has been at mostly quiet to unsettled levels until 02/0900Z when the field experienced active to minor storm levels. A favorably positioned recurrent coronal hole is believed to be responsible for activity increases.

Geophysical activity forecast: the geomagnetic field is expected to remain at mostly active to minor storm levels at middle latitudes and minor to major storm levels at higher latitudes. Isolated periods of severe storm conditions can also be expected. Based on recurrence, these conditions are forecast for the entire period and are expected to persist through at least 9 April.

Event probabilities 03 apr-05 apr

Class M	01/01/01
Class X	01/01/01
Proton	01/01/01

PCAF            Green

Geomagnetic activity probabilities 03 apr-05 apr

A. Middle Latitudes

Active	30/30/30
Minor Storm	35/40/40
Major-Severe Storm	25/25/25

B. High Latitudes

Active	30/30/30
Minor Storm	40/40/40
Major-Severe Storm	30/30/30

HF propagation conditions were near-normal until the latter part of the UTC day when levels of auroral and geomagnetic activity increased to storm levels. This produced below-normal propagation for transpolar and especially for transauroral circuits. Conditions will continue to deteriorate, affecting the middle latitudes over the next several days. Major to severe geomagnetic storming and strong levels of auroral activity could give frequent periods of useless propagation over the high and polar latitude regions, with poor to occasionally very poor propagation over many middle latitude regions. Conditions are not expected to improve during the next week.

COPIES OF JOINT USAF/NOAA SESC SOLAR GEOPHYSICAL REPORTS

=====

REGIONS WITH SUNSPOTS. LOCATIONS VALID AT 02/2400Z APRIL

-----

NMBR	LOCATION	LO	AREA	Z	LL	NN	MAG	TYPE
------	----------	----	------	---	----	----	-----	------

NONE

7694	N11W76	071						PLAGE
------	--------	-----	--	--	--	--	--	-------

7695	S15W64	059						PLAGE
------	--------	-----	--	--	--	--	--	-------

7697	N11W54	049						PLAGE
------	--------	-----	--	--	--	--	--	-------

7698	S14W36	031						PLAGE
------	--------	-----	--	--	--	--	--	-------

REGIONS DUE TO RETURN 03 APRIL TO 05 APRIL

NMBR	LAT	LO
------	-----	----

NONE

LISTING OF SOLAR ENERGETIC EVENTS FOR 02 APRIL, 1994

-----

BEGIN	MAX	END	RGN	LOC	XRAY	OP	245MHZ	10CM	SWEEP
-------	-----	-----	-----	-----	------	----	--------	------	-------

NONE

POSSIBLE CORONAL MASS EJECTION EVENTS FOR 02 APRIL, 1994

BEGIN	MAX	END	LOCATION	TYPE	SIZE	DUR	II	IV
NO EVENTS OBSERVED								

INFERRED CORONAL HOLES. LOCATIONS VALID AT 02/2400Z

ISOLATED HOLES AND POLAR EXTENSIONS									
	EAST	SOUTH	WEST	NORTH	CAR	TYPE	POL	AREA	OBSN
73	S35E53	S57W22	S53W52	S14W14	349	EXT	NEG	076	10830A

SUMMARY OF FLARE EVENTS FOR THE PREVIOUS UTC DAY

Date	Begin	Max	End	Xray	Op	Region	Locn	2695 MHz	8800 MHz	15.4 GHz
01 Apr:	1105	1110	1115	B1.3						

REGION FLARE STATISTICS FOR THE PREVIOUS UTC DAY

	C	M	X	S	1	2	3	4	Total	(%)
Uncorrelated:	0	0	0	0	0	0	0	0	001	(100.0)

Total Events: 001 optical and x-ray.

EVENTS WITH SWEEPS AND/OR OPTICAL PHENOMENA FOR THE LAST UTC DAY

Date	Begin	Max	End	Xray	Op	Region	Locn	Sweeps/Optical Observations
NO EVENTS OBSERVED.								

NOTES:

All times are in Universal Time (UT). Characters preceding begin, max, and end times are defined as: B = Before, U = Uncertain, A = After. All times associated with x-ray flares (ex. flares which produce associated x-ray bursts) refer to the begin, max, and end times of the x-rays. Flares which are not associated with x-ray signatures use the optical observations to determine the begin, max, and end times.

Acronyms used to identify sweeps and optical phenomena include:

II           = Type II Sweep Frequency Event  
III          = Type III Sweep  
IV           = Type IV Sweep  
V            = Type V Sweep  
Continuum   = Continuum Radio Event  
Loop         = Loop Prominence System,  
Spray        = Limb Spray,  
Surge        = Bright Limb Surge,  
EPL          = Eruptive Prominence on the Limb.

\*\* End of Daily Report \*\*

-----  
Date: Mon, 4 Apr 1994 00:18:59 MDT  
From: ihnp4.ucsd.edu!library.ucla.edu!psgrain!nntp.cs.ubc.ca!alberta!ve6mgs!  
usenet@network.ucsd.edu  
Subject: Daily Summary of Solar Geophysical Activity for 03 April  
To: info-hams@ucsd.edu

/\

# DAILY SUMMARY OF SOLAR GEOPHYSICAL ACTIVITY

03 APRIL, 1994

/\

(Based In-Part On SESC Observational Data)

## SOLAR AND GEOPHYSICAL ACTIVITY INDICES FOR 03 APRIL, 1994

-----

NOTE: The background x-ray flux may be in error due to the low level of  
x-rays presently emanating from the Sun. Some contamination of  
the sensors has been evident.

!!BEGIN!! (1.0) S.T.D. Solar Geophysical Data Broadcast for DAY 093, 04/03/94  
10.7 FLUX=077.4 90-AVG=100 SSN=000 BKI=5654 5446 BAI=048  
BGND-XRAY=A2.4 FLU1=4.2E+06 FLU10=1.1E+04 PKI=5776 5557 PAI=076  
BOU-DEV=114,156,085,054,081,044,055,146 DEV-AVG=091 NT SWF=00:000  
XRAY-MAX= B2.7 @ 0114UT XRAY-MIN= A1.1 @ 1954UT XRAY-AVG= A5.4  
NEUTN-MAX= +001% @ 2005UT NEUTN-MIN= -002% @ 2350UT NEUTN-AVG= -0.4%  
PCA-MAX= +0.1DB @ 2355UT PCA-MIN= -0.6DB @ 1735UT PCA-AVG= -0.0DB

BOUTF-MAX=55419NT @ 2359UT    BOUTF-MIN=55263NT @ 0838UT    BOUTF-AVG=55325NT  
GOES7-MAX=P:+000NT@ 0000UT    GOES7-MIN=N:+000NT@ 0000UT    G7-AVG=+071,+000,+000  
GOES6-MAX=P:+160NT@ 1845UT    GOES6-MIN=N:-156NT@ 2349UT    G6-AVG=+090,+032,-063  
FLUXFCST=STD:075,075,075;SESC:075,075,075 BAI/PAI-FCST=040,040,035/055,050,040  
KFCST=4457 6554 4675 5555    27DAY-AP=045,038    27DAY-KP=5356 5555 5545 4544  
WARNINGS=\*GSTRM;\*AURMIDWRN  
ALERTS=\*\*MAJSTRM  
!!END-DATA!!

NOTE: The Effective Sunspot Number for 02 APR 94 was 40.8.  
The Full Kp Indices for 02 APR 94 are: 3o 2+ 4+ 5o 4+ 5- 5o 5+  
The 3-Hr Ap Indices for 02 APR 94 are: 16 9 33 51 34 37 51 53  
Greater than 2 MeV Electron Fluence for 03 APR is: 1.9E+08

#### SYNOPSIS OF ACTIVITY

-----

Solar activity was very low. The disk remained spotless for the second day in a row.

Solar activity forecast: solar activity is expected to remain at very low levels.

At middle latitudes, the geomagnetic field has been at mostly active to minor storm levels with isolated periods of major to severe storm levels observed. High latitudes experienced mostly minor to major storm levels with some isolated periods of severe storm conditions. The storm conditions are believed to be a result of a favorably positioned recurrent coronal hole. The greater than 2 MeV electron flux reached high levels at 03/1845Z. (STD: Overall electron fluence levels were generally at moderate levels.)

Geophysical activity forecast: the geomagnetic field is expected to remain at mostly active to minor storm levels at middle latitudes and active to major storm levels at high latitudes. Isolated periods of major storm levels at mid lats and severe storm levels at high lats can be expected. Based on recurrence, these conditions are forecast for the entire period and can be expected to persist through 9 April.

Event probabilities 04 apr-06 apr

Class M	01/01/01
Class X	01/01/01
Proton	01/01/01
PCAF	Green

Geomagnetic activity probabilities 04 apr-06 apr

A. Middle Latitudes

Active	30/30/30
Minor Storm	40/40/40
Major-Severe Storm	25/25/25

B. High Latitudes

Active	30/30/30
Minor Storm	40/40/40
Major-Severe Storm	30/30/30

HF propagation conditions became strongly disturbed over the high and polar latitude paths with the arrival of the anticipated geomagnetic storm. Strong fading and absorption along with heavy multipathing has degraded most transpolar and transauroral circuits. Conditions were generally extremely poor to unusable with frequent radio-blackout conditions for high and polar latitude signal circuits. Middle latitude paths have also been moderately affected with well below normal signal quality, reduced MUFs and strong levels of fading and absorption. Low latitudes observed near-normal propagation with occasional minor signal degradation bringing overall signal qualities within the good to fair range. Conditions will continue strongly degraded over the next 24 to 72 hours with very little improvements (particularly on the upper middle to polar latitude paths) expected over the next week.

COPIES OF JOINT USAF/NOAA SESC SOLAR GEOPHYSICAL REPORTS

=====

REGIONS WITH SUNSPOTS. LOCATIONS VALID AT 03/2400Z APRIL

-----

NMBR	LOCATION	LO	AREA	Z	LL	NN	MAG	TYPE
------	----------	----	------	---	----	----	-----	------

NONE

7694	N11W89	071						PLAGE
7695	S15W77	059						PLAGE
7697	N11W67	049						PLAGE
7698	S14W49	031						PLAGE

REGIONS DUE TO RETURN 04 APRIL TO 06 APRIL

NMBR	LAT	LO
------	-----	----

NONE

LISTING OF SOLAR ENERGETIC EVENTS FOR 03 APRIL, 1994

-----



A. ENERGETIC EVENTS:

BEGIN MAX END RGN LOC XRAY OP 245MHZ 10CM SWEEP  
NONE

POSSIBLE CORONAL MASS EJECTION EVENTS FOR 03 APRIL, 1994

-----  
BEGIN MAX END LOCATION TYPE SIZE DUR II IV  
NO EVENTS OBSERVED

INFERRED CORONAL HOLES. LOCATIONS VALID AT 03/2400Z

-----  
ISOLATED HOLES AND POLAR EXTENSIONS  
EAST SOUTH WEST NORTH CAR TYPE POL AREA OBSN  
NONE VISIBLE

SUMMARY OF FLARE EVENTS FOR THE PREVIOUS UTC DAY

-----  
Date Begin Max End Xray Op Region Locn 2695 MHz 8800 MHz 15.4 GHz  
-----  
02 Apr: 0451 0454 0456 B1.0  
1210 1217 1225 B2.3  
1947 1955 2009 B1.5

REGION FLARE STATISTICS FOR THE PREVIOUS UTC DAY

-----  
C M X S 1 2 3 4 Total (%)  
-- -- -- -- --  
Uncorrelated: 0 0 0 0 0 0 0 0 003 (100.0)

Total Events: 003 optical and x-ray.

EVENTS WITH SWEEPS AND/OR OPTICAL PHENOMENA FOR THE LAST UTC DAY

-----  
Date Begin Max End Xray Op Region Locn Sweeps/Optical Observations  
-----  
NO EVENTS OBSERVED.

NOTES:

All times are in Universal Time (UT). Characters preceding begin, max,

and end times are defined as: B = Before, U = Uncertain, A = After. All times associated with x-ray flares (ex. flares which produce associated x-ray bursts) refer to the begin, max, and end times of the x-rays. Flares which are not associated with x-ray signatures use the optical observations to determine the begin, max, and end times.

Acronyms used to identify sweeps and optical phenomena include:

II	= Type II Sweep Frequency Event
III	= Type III Sweep
IV	= Type IV Sweep
V	= Type V Sweep
Continuum	= Continuum Radio Event
Loop	= Loop Prominence System,
Spray	= Limb Spray,
Surge	= Bright Limb Surge,
EPL	= Eruptive Prominence on the Limb.

\*\* End of Daily Report \*\*

-----

Date: 4 Apr 94 03:45:34 GMT  
From: ihnp4.ucsd.edu!agate!howland.reston.ans.net!news.intercon.com!udel!  
news.sprintlink.net!connected.com!beauty!rwing!eskimo!holcombe@network.ucsd.edu  
Subject: Looking for Kenwood TM-742a mods.  
To: info-hams@ucsd.edu

I'm looking for any and all mods. that can be done on the kenwood TM-742A radio. I would like to know also if this radio can receive the 800 band? and if so how do I get it to receive it. you can e-mail me the information at holcombe@camel.campbell.edu and if any one knows if I can switch the bands around so that I can have a set up of 6m 220 and 440, please let me know.

Douglas H. Holcombe, KB5YZI  
holcombe@camel.campbell.edu

-----

Date: Sun, 3 Apr 1994 23:46:00 GMT  
From: ihnp4.ucsd.edu!agate!iat.holonet.net!brranch!mark.frye@network.ucsd.edu  
Subject: Packet Radio  
To: info-hams@ucsd.edu

Hey could anybody out there in Cyber-Land give me a detailed, yet general, description of what a person needs, equipment and software wise, to start enjoying packet radioing.

Write me here, or at MCFRYE@AOL.COM

Thank you. I would really appreciate a response.  
MCF

---

QMPPro 1.51 Your E-Mail has been returned due to insufficient voltage

-----  
Date: Sun, 3 Apr 1994 11:01:00 GMT  
From: ihnp4.ucsd.edu!usc!yeshua.marcam.com!news.kei.com!ddsw1!n9csa!  
jay.serafin@network.ucsd.edu  
Subject: Plain old repeaters  
To: info-hams@ucsd.edu

PR>>to stop transmitting so the remote stops transmitting, so it is in a  
PR>>position to receive my signal and turn around.

PR>Cellular phones do this all the time, including pocket sized ones.  
PR>In fact some of them are smaller than any ham HT that I know of.

Ah, but when you're talking about a 45MHz split, as opposed to a 600kHz split, the "bandpass" and the tuning of the cavity is HUGE! In fact, it's pretty well tantamount to a circulator than a cavity/duplexer

\* SLMR 2.1a \*

-----  
Date: Sun, 3 Apr 1994 21:22:38 GMT  
From: ihnp4.ucsd.edu!usc!howland.reston.ans.net!torn!nott!cunews!revcan!rubicon!  
cowan@network.ucsd.edu  
Subject: TM742 info/mods  
To: info-hams@ucsd.edu

I would appreciate it if anyone having info on TM742 mods and/or undocumented features could e-mail me such information, please.

Thanks  
-pdc

--

=====

Darin Cowan           |           cowan@rubicon.org  
VE3OIJ               |           root@rubicon.org

=====

-----

Date: 3 Apr 1994 23:03:54 GMT  
From: yar.cs.wisc.edu!sjg@rsch.wisc.edu  
Subject: University of Florida, Gainesville  
To: info-hams@ucsd.edu

Sorry for the intrusion, but I was wondering if anyone could email input on the University of Florida, in Gainesville. I read this group all the time and I figured I could reach a lot of people quickly this way.

I have an opportunity to study there this summer, particularly in the psych dept, and I would like input from anyone who studied/lived there, to help me make my decision. (what the campus is like, how big the school is, how close the campus is to the real world, about the city, Gainesville, anything about the campus would be helpful)

I will be unable to read this newsgroup this week, but I will have access to my email, so please email any responses to sjg@yar.cs.wisc.edu

Thanks much for your help.  
Steve Glinberg

--

E mail:	BEST ADDRESS	sjg@yar.cs.wisc.edu
	2nd best address	glinberg@students.wisc.edu
	3rd best	glinberg@macc.wisc.edu

-----

Date: Sun, 3 Apr 1994 21:53:48 GMT  
From: news.Hawaii.Edu!uhunix3.uhcc.Hawaii.Edu!jherman@ames.arpa  
Subject: Wanted: Programable Keyer  
To: info-hams@ucsd.edu

Of the 100 or so worldwide 10M beacons none are in Hawaii. I've been wanting to remedy this for quite some time. I'll be using a CB xmtr recrystalled to 28.2xx MHz into a 5/8 wave antenna.

The only item left to get is a programable keyer. Does anyone have one they want to sell (cheaply - it's for a good cause!)?

Thanks so much.

Jeff NH6IL

-----  
Date: 4 Apr 94 05:38:33 GMT  
From: dog.ee.lbl.gov!agate!usenet.ins.cwru.edu!cleveland.Freenet.Edu!  
cq068@ucbvax.berkeley.edu  
Subject: Weather obs by packet  
To: info-hams@ucsd.edu

Are there any operators/groups that have interfaced weather  
intruments to provide wind, temp, etc. info?  
Drop a line to me at  
cq068@cleveland.freent.edu

Steve Lapinskas  
KA1JJA

-----  
Date: 4 Apr 94 00:36:36 GMT  
From: dog.ee.lbl.gov!agate!iat.holonet.net!rohrwerk@ucbvax.berkeley.edu  
To: info-hams@ucsd.edu

References <1994Mar29.160241.20722@ke4zv.atl.ga.us>,  
<CnG3Jt.Htw@srngenprp.sr.hp.com>, <2nahmv\$9q9@hpscit.sc.hp.com>  
Subject : Re: How phasing SSB Exciters Work (Was: RF and AF speech processors)

rkarlqu@scd.hp.com (Richard Karlquist) writes:

>In any event, if the receiver is a transceiver, and it uses  
>the same filter for receive and transmit, then all the nasty  
>ripples you avoided with a phasing type transmitter will  
>be reintroduced at the receiver. So you really need a phasing  
>transmitter and phasing receiver to get "hi-fi" audio. Or

Like the Campbell R2 receiver, Jan. 1993 QST! For whatever combination of  
reasons, it IS a clean sounding unit. I'll bet his companion phasing SSB  
exciter sounds just as good.

John K0JD

-----  
End of Info-Hams Digest V94 #373

\*\*\*\*\*  
\*\*\*\*\*